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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/689,425	10/20/2003	Gordon Bremer	061606-1671	2794
24504 7590 11/10/2009 THOMAS, KAYDEN, HORSTEMEYER & RISLEY, LLP 600 GALLERIA PARKWAY, S.E. STE 1500 ATLANTA, GA 30339-5994				
EXAMINER				
TSE, YOUNG TOI				
ART UNIT		PAPER NUMBER		
2611				
MAIL DATE		DELIVERY MODE		
11/10/2009		PAPER		

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/689,425

Applicant(s)

BREMER ET AL.

Examiner

YOUNG T. TSE

Art Unit

2611

Period for Reply -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 14 July 2009.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 2-11, 13, 14, 18, 20-22, 24, 25, 29-43, 45-54 and 56-72 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 21, 50 and 51 is/are rejected.
- 7) ☒ Claim(s) 2-11, 13, 14, 18, 20, 22, 24, 25, 29-43, 45-49, 52-54 and 56-72 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftperson's Patent Drawing Review (PTO-848)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

Claim Objections

1. Claims 2-11, 13, 22, 24-25, 29, 31-43, 45-49, 54, and 56 are objected to because of the following informalities:

Claim 2, lines 5-6, the term "the received signal comprising a plurality of sub-bands, each sub-band transmitted at a respective transmit power level" should be removed and replaced after the word "parameter" at line 8 of the claim.

Claim 49, lines 3-4, "the sub-band" should be "the sub-band of the received signal".

The dependent claims 3-11, 13, and 29 are either directly or indirectly depended from the independent claim 2. Therefore, they are also objected.

Claim 22, line 8, "the received signal" should be "a sub-band of the received signal"; and line 10, "the received signal" should be "the sub-band of the received signal".

Claims 24 and 25 should be cancelled since the claimed subject matters of the claims are already recited in the precedent claim 22.

Claim 54, line 1, "claim 25" should be "claim 22".

The dependent claim 56 depends from the independent claim 22. Therefore, it is also objected.

Claim 31, line 9, "the received signal" should be "a sub-band of the received signal"; and line 11, "the received signal" should be "the sub-band of the received signal".

Claims 32 and 33 should be cancelled since the claimed subject matters of the claims are already recited in the precedent claim 31.

The dependent claims 34-36 and 57-61 are either directly or indirectly depended from the independent claim 31. Therefore, they are also objected.

Claim 37, line 2, "a DSL" should be "a transmitting DSL modem"; and line 8, "a transmitting DSL modem" should be "the transmitting DSL modem".

Claims 42 and 43 should be cancelled since the claimed subject matters of the claims are already recited in the precedent claim 37.

The dependent claims 38-41 and 45-48 are either directly or indirectly depended from the independent claim 37. Therefore, they are also objected.

Appropriate correction is required.

Claim Rejections - 35 USC § 112

2. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

3. Claims 21 and 50-51 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 21, lines 2 and 4, Applicant is requested to clarify the differences of "a signal" and "a signal-to-noise-ratio" as recited in the precedent claim 14, lines 2 and 6.

The dependent claims 50 and 51 are either directly or indirectly depended from claim 21. Therefore, they are also rejected.

Allowable Subject Matter

4. Claims 14, 18, 20, 30, 52, 53, and 63-72 are allowed.
5. Claims 2-11, 13, 29, 49, 22, 54, 56, 31, 34-36, 57-62, 37-41, and 45-48 would be allowable if rewritten or amended to overcome the objection(s), set forth in this Office action.
6. Claims 21 and 50-51 would be allowable if rewritten or amended to overcome the rejection(s) under 35 U.S.C. 112, 2nd paragraph, set forth in this Office action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to YOUNG T. TSE whose telephone number is 571- 272-3051. The examiner can normally be reached on Monday-Friday 10:00-6:30 PM, EST.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mohammad H. Ghayour can be reached on 571- 272-3021. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/YOUNG T. TSE/
Primary Examiner, Art Unit 2611